

### Claims

- 1     1.     A method for controlling production or manufacturing costs by obtaining  
2     measurements of unit manufacturing for a multiplicity of products or production lines  
3     and having a started units number for a plurality of processes, comprising the steps  
4     of:  
5         determining an approved units number for said plurality of processes;  
6         determining a unit production cost for each said unit in said plurality of processes;  
7         calculating an unapproved units number for each said process;  
8         calculating a cost of yield measurement for each of said plurality of processes by  
9             multiplying said unapproved units number by said unit production cost for said  
10            each said unit; and  
11        comparing said cost for each unapproved unit for each said process.
  
- 1     2.     The method of claim 1 further comprising the steps of:  
2         providing an expected yield measurement for each of said plurality of processes;  
3         calculating an expected approved units number by multiplying said started units  
4             number by said expected yield measurement;  
5         calculating an actual yield for each of said plurality of processes;  
6         providing a comparison of said cost of yield with said actual yield for each said  
7             plurality of processes.
  
- 1     3.     A method for controlling production or manufacturing costs by obtaining yield  
2     measurements of unit manufacturing for a multiplicity of products or production lines  
3     having a plurality of processes, comprising the steps of:  
4         determining a started units number for said plurality of processes;  
5         determining a cost per unit for each said unit of said plurality of processes;  
6         calculating an expected approved units number for said plurality of processes by  
7             multiplying said started units number by an expected yield measurement;

8 calculating an actual approved units number for each of said plurality of processes  
9 by multiplying said started units number by an actual yield measurement;  
10 calculating an unapproved units number for each of said plurality of processes by  
11 subtracting said expected approved units number from said actual approved  
12 units number;  
13 calculating cost of yield measurements for said plurality of processes by  
14 multiplying said unapproved units number by said cost per unit; and  
15 providing a comparison of said cost of yield measurements for said plurality of  
16 processes.

1 4. The method of claim 3 further comprising the steps of:  
2 calculating an actual yield measurement by dividing an initial approved units  
3 number by said started units number for each of said plurality of processes;  
4 providing a comparison of said actual yield measurement for said plurality of  
5 processes;  
6 calculating an expected yield measurement by dividing an initial expected  
7 approved units number by said started units number for each of said plurality  
8 of processes; and  
9 providing a comparison of said expected yield measurement for said plurality of  
10 processes.

1 5. A method for controlling and improving production or manufacturing costs by  
2 obtaining yield measurements of unit manufacturing for a multiplicity of products or  
3 production lines having a plurality of processes, comprising the steps of:  
4 determining an initial started units number for said plurality of processes;  
5 determining a cost per unit number for each said unit of said plurality of  
6 processes;

7 calculating an actual yield measurement by dividing an initial approved units  
8 number by said initial started units number for each of said plurality of  
9 processes;  
10 providing a comparison of said actual yield measurement for said plurality of  
11 processes;  
12 calculating expected yield measurements by dividing an expected approved units  
13 number by said initial started units number for each of said plurality of  
14 processes;  
15 providing a comparison of said expected yield measurements for said plurality of  
16 processes;  
17 calculating an initial actual approved units number for said plurality of processes  
18 by multiplying a subsequent started units number by said actual yield  
19 measurement;  
20 calculating subsequent expected approved units numbers for said plurality of  
21 processes by multiplying said subsequent started units numbers by said  
22 expected yield measurement;  
23 calculating cost of yield measurements for said plurality of processes by  
24 multiplying said subsequent expected approved units number by said cost per  
25 unit; and  
26 providing a comparison of said cost of yield measurements for a plurality of  
27 processes.

1 6. The method of claim 5 further comprising the step of:  
2 calculating a subsequent actual unapproved units number for a plurality of  
3 processes by subtracting said subsequent expected approved units number from  
4 a subsequent actual approved units number.

1 7. The method of claim 5 wherein said yields are recalculated with subsequent  
2 data and tabulated for comparing said yields.

1        8.        The method of claim 5 wherein said plurality of processes run simultaneously.

1        9.        The method of claim 5 further comprising the step of:  
2            applying resources to said processes having the highest cost of yield based on said  
3            comparing of said costs of yield measurements.

1        10.       A method for controlling production or manufacturing costs by obtaining and  
2        comparing measurements of unit manufacturing costs for production or manufacturing  
3        of a plurality of products or production lines, comprising the steps of:  
4            determining a started units number for each of a plurality of processes;  
5            determining an approved units number for each of said plurality of processes;  
6            determining a unit production cost for each said unit of each said process;  
7            calculating an unapproved units number by subtracting said units started number  
8            from said approved units number;  
9            calculating cost of yield measurement for each of said plurality of processes by  
10           multiplying said unapproved units number by said unit production cost for each  
11           of said plurality of processes; and  
12           providing a comparison of said cost of yield measurement for each of said  
13           plurality of processes.

1        11.       The method of claim 10 further comprising the steps of:  
2            calculating an actual yield measurement by dividing said approved units number  
3            by said started units number for each of said plurality of processes; and  
4            providing a comparison of said actual yield measurement of each of said plurality  
5            of processes.

1        12.       The method of claim 10 further comprising the steps of:  
2            calculating a target yield measurement; and

3 providing a comparison of said target yield measurement for each of said plurality  
4 of processes.

1 13. The method of claim 10 wherein said yields are recalculated with subsequent  
2 data and tabulated for comparing said yields.

1 14. The method of claim 10 wherein said plurality of processes run  
2 simultaneously.

1 15. The method of claim 10 further comprising the step of:  
2 applying resources to said processes having the highest cost of yield based on said  
3 comparing of said costs of yield measurements.

1 16. A method for controlling and improving production or manufacturing costs by  
2 obtaining and comparing yield measurements of unit manufacturing for a plurality of  
3 products or production lines comprising the steps of:  
4 determining a started units number for each of a plurality of processes;  
5 determining an approved units number for each of said plurality of processes;  
6 determining a unit production cost for each said unit of each said process;  
7 calculating an actual yield measurement by dividing said approved units number  
8 by said started units number for each of said plurality of processes;  
9 providing a comparison of said actual yield measurements for each of said  
10 plurality of processes;  
11 calculating a number of unapproved units by subtracting said started units number  
12 from said approved units number;  
13 calculating cost of yield measurement for each of said plurality of processes by  
14 multiplying said number of unapproved units by said unit production cost for  
15 each unit; and

16 providing a comparison of said cost of yield measurement for each of said  
17 plurality of processes.

1 17. The method of claim 16 further comprising the steps of:  
2 calculating an expected approved units number by multiplying said started units  
3 number by an expected yield measurement; and  
4 calculating said approved units number by multiplying said started units number by  
5 said actual yield measurement.

1 18. The method of claim 17 further comprising the steps of:  
2 calculating an expected yield measurement by dividing said expected approved  
3 units number by said started units number; and  
4 providing a comparison of said expected yield measurements for each of said  
5 plurality of processes.

1 19. The method of claim 16 further comprising:  
2 determining a sale cost of each said unit for each said process;  
3 calculating cost of lost sales for each of said plurality of processes by multiplying  
4 said number of unapproved units by said sale cost for each unit;  
5 providing a comparison of said cost of lost sales for each of said plurality of  
6 processes.

1 20. A computer program product for controlling production or manufacturing costs  
2 by obtaining measurements of unit manufacturing for a multiplicity of products or  
3 production lines and having a started units number for a plurality of processes, said  
4 computer program product having:  
5 computer readable program code means for determining an approved units number  
6 for said plurality of processes;

7 computer readable program code means for determining a unit production cost for  
8 each said unit in said plurality of processes;  
9 computer readable program code means for calculating an unapproved units  
10 number for each said process;  
11 computer readable program code means for calculating a cost of yield  
12 measurement for each of said plurality of processes by multiplying said  
13 unapproved units number by said unit production cost for said each said unit;  
14 and  
15 computer readable program code means for comparing said cost for each  
16 unapproved unit for each said process.

1 21. A program storage device readable by a machine, tangibly embodying a  
2 program of instructions executable by the machine to perform steps for controlling  
3 production or manufacturing costs by obtaining measurements of unit manufacturing  
4 for a multiplicity of products or production lines and having a started units number for  
5 a plurality of, said method steps comprising:  
6 determining an approved units number for said plurality of processes;  
7 determining a unit production cost for each said unit in said plurality of processes;  
8 calculating an unapproved units number for each said process;  
9 calculating a cost of yield measurement for each of said plurality of processes by  
10 multiplying said unapproved units number by said unit production cost for said  
11 each said unit; and  
12 comparing said cost for each unapproved unit for each said process.